Amendments to the Claims

1   1. (currently amended) A method for concealing errors in an intra-frame of a

2   compressed video, comprising:

3   decoding the intra-frame to a plurality of macroblocks, each

4   macroblock including a plurality of pixels arranged in a rectangular array;

5   locating a lost macroblock during the decoding;

6   concealing pixels along an outer boundary of the lost macroblock

7   from nearest candidate pixels along outer boundaries of macroblocks

8   immediately adjacent to the lost macroblock; and

9   concealing all other pixels in the lost macroblock from nearest

10   candidate pixels selected from previously concealed pixels in the lost

11   macroblock; and further comprising:

12   sorting the candidate pixels C_i in an ascending order in terms of

13   intensity values of the candidate pixels;

14   determining a median value of the ordered candidate pixels;

15   determining a difference $Diff_i$ between the intensity value of the ith

16   candidate pixel and the median intensity value;

17   determining a distance $Dist_i$ between the ith candidate pixel and the

18   current pixel;

19   determining an evaluation score S_i for the ith candidate pixel as sum

20   of $Diff_i$ and $Dist_i$;

21   if the evaluation score S_i is greater than a threshold T, then rejecting

22   the ith candidate pixel; and

23   linearly interpolating remaining candidate pixels and assign an

24   interpolated value to the current pixel p according to

25   $$p = (\sum_i \frac{C_i}{Dist_i}) / (\sum_i \frac{1}{Dist_i}) .$$

1   2. (original) The method of claim 1, in which the candidate pixels are

2   directly above, below, to the left and to the right of a current pixel to be

3   concealed.

1   3. (original) The method of claim 1, in which the pixels in the lost block are

2   concealed in a spiral order, starting at an upper left corner of the lost block,

3   and running then along the outer boundary, and ending in the middle of the

4   lost block.

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6   4. (cancelled)

1   5. (currently amended) The method of claim 1 [[4]], in which the threshold is

2   twenty.

1   6. (currently amended) The method of claim 1 [[4]], in which the distance

2   metric is the number of pixels from the current pixel to the candidate pixel.

7. (new) The method of claim 1, further comprising:

encoding an uncompressed video into inter-frames and intra-frames to

produce the compressed video;

replicating macroblocks along edges of each inter-frame; and

appending the replicated macroblocks at an end of the inter-frame.